ENVIRONMENTAL ASSESSMENT

EA Number: OR-104-02-10

BLM Office: Swiftwater FO, Roseburg District

Proposed Action Title: **Tioga Segment Reconstruction (North Umpqua Trail)**

Loc**ation of Proposed Action:** Sections 1 & 12, T.26S., R.3W., W.M.

Conformance with Applicable Land Use Plan:

This proposed action is subject to the following land use plan:

Name of Plan:	Roseburg District Record of Decision and Resources Management Plan (RMP)
Date Approved:	June 2, 1995.
Name of Plan:	North Umpqua Wild and Scenic River Plan
Date Approved:	July 1992

These plans have been reviewed to determine if the proposed action conforms with terms and conditions as required by 43 CFR 1610.5.

Need for Proposed Action:

The 79-mile North Umpqua Trail was constructed to provide safe recreational opportunities for hiking, mountain biking, as well as equestrian users. These types of uses necessitate design standards requiring a wider tread and greater clearing limits than a normal hiking trail. Approximately 10,500 visitors use the trail annually of which the BLM maintains an eleven-mile portion of the trail that was partially constructed by volunteers in the late 1980's. Using hand tools they pioneered several miles of narrow winding trail that follows the contour of the ground. This original construction left many rocks and roots as obstacles in the trail and does not meet current standards. Several sections of the original trail have been reconstructed to such standards using mechanized trail equipment. Approximately 2600 feet of the original trail remains. This section needs to be reconstructed to the same, higher standard as the rest of the 79-miles of trail to provide for safe use by the various user types.

Purpose of Action:

The purpose of the action described in this EA is to improve the trail safety of the Tioga Segment of the North Umpqua Trail. Currently there are hundreds of tripping hazards along the 2600-foot portion of the trail. Reconstruction of this section would remove all on the ground hazards and develop a safe trail tread and brush clearing area that will meet BLM trail standards.

Description of Proposed Action:

This project would upgrade the remaining unimproved portion of the Tioga Segment of the North Umpqua Trail using a variety of equipment types ranging from ATV and trailer, motorized wheelbarrow and mini-excavator to chainsaws, wheelbarrows, and other hand tools. The reconstruction of approximately 2600 feet of the North Umpqua Trail (approximately 502 feet of the trail is on BLM lands and the remainder is on lands owned by Douglas County (DC)) would include widening the trail to 48 inches, cutting encroaching trees (<16 Inches dbh), removing all protruding rocks in the trail path, covering hundreds of roots with soil and then gravel, establishing brush clearing limits of 8= x 8= and improving the trail drainage. The trail reconstruction would begin at the Deadline Falls trail junction and continue to the trail junction leading to the Douglas County Park Swiftwater Pavilion (see attached map and photo).

Affected Environment:

The FSEIS describes the affected environment for the Cascades province on page 3&4-19. The Roseburg District Proposed Resource Management Plan/Environmental Impact Statement (PRMP/EIS, pp. 3-3 through 3-71) provides a detailed description of BLM administered lands on the Roseburg District. A further description can also be found in the Middle North Umpqua Watershed Analysis (MNUWA).

The affected area was surveyed for the resources listed below according to established protocols. The project occurs in a mature late-successional stand (80 years or older).

Botany - A prefield survey was performed with a result of no known sites of either Special Status Plants (SSP) or Survey and Manage (S&M) species currently occurring in the project area. Numerous informal botanical surveys have been performed in the project area over the past two years, and no SSP sites have been identified (personal communication, R. Wickline). A recent (11 June, 2002) botanical survey was conducted in the project area. SSP and S&M species targeted for this survey are listed in the appendix (See Prefield Survey). No SSP or S&M were found.

There were two noxious weed species discovered during this survey: *Hedera helix* (English ivy), and *Cirsium arvense* (Canada thistle). These two species were found in an intermittent stream channel adjacent to the existing trail. Both species were manually controlled and removed from the project area

Wildlife - There are two known northern spotted owl (NSO) sites (Hills Creek [IDNO #0383] and Swift Cougar [IDNO #2152A]) within 1.2 miles of the project area, but there are no known spotted owl sites within 0.25 miles (disturbance zone) of the project area. The project is not within a 100-acre owl core area nor is it located within a Critical Habitat Unit for the NSO. Critical Habitat is a specific geographical area specified by the US Fish and Wildlife Service in Recovery Plans as containing habitat essential for the conservation of a Threatened and Endangered species. The remaining terrestrial T&E species do not occur in the project area (See Appendix, Summary of Wildlife Concerns for Environmental Analysis).

The only Survey & Manage species whose habitat is present within the project area is the red tree vole (RTV). However, the trees and snag to be removed are on Douglas County property. Therefore, surveys for RTVs are not required.

Cultural Resources - Archaeological site 35DO359 is partially located within the project area. The site was evaluated in 1989 in response to the proposed construction of a parking lot. Although a formal determination of eligibility was not obtained, significant cultural deposits were encountered. The deposits, however, are not uniformly distributed within the site area and occur only within the first 140 feet of the trail.

Fisheries - The proposed project is located adjacent to a fish-bearing portion of the North Umpqua River (MNUWA) consisting of, but not limited to, steelhead trout, cutthroat trout, chinook salmon and coho salmon. The Oregon Coast (OC) coho has been designated as a threatened species, OC steelhead trout, and Coastal cutthroat trout are considered candidate species under ESA.

Hydrology - The proposed project is located within the Middle North Umpqua River fifth-field watershed in the Swiftwater drainage area that includes all lands draining into the North Umpqua River from below the confluence with Honey Creek to above the confluence with Rock Creek. The North Umpqua River has been identified by the Oregon Department of Environmental Quality (DEQ) as water quality limited for temperature and flow modification from its mouth to Steamboat Creek (Oregon DEQ, 1998). The segment of the North Umpqua Trail included in this project, runs parallel along the south side of the North Umpqua River. The trail is mostly on a terrace with very gently sloping topography. Distance to the North Umpqua River varies from a minimum of about 230 feet to a max of about 570 feet, with an average distance of about 390 feet (GIS Data). The trail crosses a few small streams all of which have existing boardwalk or bridge crossing structures.

Soils - The trail segment to be improved crosses gentle to moderate slopes (3 to 50 percent). The soils are dominantly well drained with inclusions of wetter soils in swales and along streams. Soil depths are very deep (greater than 60 inches to bedrock). Surface textures are typically gravelly and very gravelly loams (moderate to low erodibility). The upper subsoils are typically gravelly to very stony clay loams (also moderate to low erodibility).

Environmental Impacts of the Proposed Action:

Description of Potential Impacts

Analysis considers the direct impacts (effects caused by the action and occurring at the same place and time), indirect impacts (effects caused by the action but occurring later in time and/or farther removed in distance) and cumulative impacts (effects of the action when added to other past, present and reasonably foreseeable future actions) on the resource values.

Botany - Direct impacts consist of a limited amount of ground disturbance that would result from the proposed trail reconstruction. Any soil displaced from the trail (i.e. cut bank) would be used in the immediate area (i.e. fill slope). Any native seed source in the soil would remain in the immediate vicinity of where it was disturbed. Trees/snags cut would be left along the trail. A small number of common, native herbs and shrubs would be removed. No tree mortality would be anticipated from treatments affecting tree roots. Indirect impacts consist of the potential for invasion by noxious weeds from equipment, workers, and users.

Wildlife - Direct impacts consist of mortality to species or habitat removal at the time of action. Indirect impacts include disturbance to species that might occur as a result of the action alternative, later in time or farther removed in distance, but still reasonably foreseeable. There is no effect to either the NSO or RTVs since the proposed improvements to this facility will not change the character of the stand or the ability of the stand to function as it does currently for both species. There are no anticipated direct impacts or indirect impacts to other special status wildlife species within the project area.

Cultural Resources - Ground-disturbing activities could damage and displace artifacts, resulting in a change to the significant characteristics of the site.

Fisheries - The proposed project would have no direct or indirect impacts to fisheries. The project will be performed by hand labor and is located more than 230 feet from the North Umpqua River. There is one non-fish bearing perennial stream and two non-fish bearing intermittent streams within the project area that are tributaries to the North Umpqua River. However, all works would be outside of the bankfull widths and would not create any affects to fisheries further downstream.

Hydrology - Direct and indirect impacts to hydrology would be minimal. Sediment delivery to the North Umpqua River would be negligible. A small, temporary (less than one year), local increase in sediment production from trail widening and application of gravel surfacing is expected. However, due to the gentle terrain and distance to the North Umpqua River, sediment movement would be localized to the trail site and will dissipate into the adjacent forest floor. A couple of stream crossings would be improved and a boardwalk structure would be built over a wet area. These improvements will result in a long-term reduction in sediment production from trail use. Water quality in the North Umpqua River would not be changed from the current condition by this project.

Soils - The direct and indirect impacts are minimal. Less than an acre of forest soil would be covered in new trail surface. Cutting into the slope to get the additional trail width would not pose any landslide risks. Covering exposed roots first with soil before the lift of gravel is laid down would reduce damage to those roots. The lift of gravel would give good erosion protection. The structures to be built across low wet spots would protect the sensitive soils there. Any sediment resulting from construction would be very small and temporary.

Cumulative Impacts: There are no anticipated negative long-term cumulative impacts to the project area resulting from the implementation of the proposed project. The additions to the cumulative impacts at the fifth field scale are inconsequential (MNUWA).

Critical Elements of the Human Environment:

ACritical Elements of the Human Environment_ is a list of elements specified in BLM Handbook H-1790-1 that must be considered in all EA's. These are elements of the human environment subject to requirements specified in statute, regulation, or executive order. These elements have been analyzed for potential effects and are as follows:

Critical Elements	Potentially Affected	
	No	Yes
Air Quality	X	
ACEC		X
Cultural Resources		X
Environmental Justice	X	
Farmlands, Prime/Unique	X	
Floodplains	X	
Invasive and Nonnative Species		X
Nat. Amer. Rel. Concerns	X	
T & E Aquatic Species		X
T & E Terrestrial Species		X
Waste, Hazardous/Solid	X	
Water Quality, Drinking / Ground	X	
Wetlands/Riparian Zones		X
Wild and Scenic Rivers	X	
Wilderness	X	

ACEC - This project complies with the North Umpqua River Special Recreation Area and Area of Critical Concern (ACEC) Management Plan (Feb. 1984, pgs. 19, 21).

Cultural Resources - See Environmental Impacts above.

Invasive and Nonnative Species - See Environmental Impacts Botany Indirect Impacts above.

T & E Species -

Wildlife - The project area is in an existing facility and the proposed improvements to this facility will not change the character of the stand or the ability of the stand to function as dispersal habitat for the NSO. The regular use of the Tioga segment of the North Umpqua Trail by the public limits the probability that spotted owls will routinely use this area due to regular human activity.

Aquatic - The project would have no effect on coho salmon, steelhead trout, and cut throat trout. The proposed project is located within Essential Fisheries Habitat (EFH), but would not have any adverse impacts on EFH.

Wetlands/Riparian Zones - Reconstruction activities would take place within the Riparian Reserve for the North Umpqua River.

Wild and Scenic Rivers - This project complies with the North Umpqua Wild and Scenic River Management Plan (July 1992, pg. 23).

Description of Mitigation Measures and Residual Impacts:

1. Cultural Resources - Restrict ground disturbance within the first 140 feet of the trail by filling rather than cutting and by using only hand tools.

2. To minimize or prevent the spread of noxious weeds within the project area:
   - utilize trail gravel that is as free of noxious weed seed as possible.
   - thoroughly clean all mechanized equipment used in the project prior to move-in.

3. To the extent possible, utilize the native herbs and shrubs displaced by the proposed project to landscape other areas of the trail and trailhead.

4. Large rocks within the trail path would be removed, but left to the side of the trail.

5. Minimize brushing within 20 feet of perennial stream edges and 10 feet of intermittent stream edges. This requirement would help maintain vegetation to meet understory shading, nutrient, and bank stability needs.

6. Reconstruction activities would be limited to dry weather. Side casting of material from trail widening would not be allowed near wetland areas or streams. These measures would reduce the potential for sediment delivery to the North Umpqua River from the proposed action.

Agencies, Persons, and Permittees Consulted:

National Marine Fisheries Service
Douglas County Commissioners
Douglas County Parks
Confederated Tribes of the Grand Ronde
Cow Creek Band of the Umpqua

Preparers:

Isaac Barner	_____	Archeology
Mike Crawford	_____	Fisheries Biologist
Dan Cressy	_____	Soil Scientist
Dan Dammann	_____	Hydrologist
Rex McGraw	_____	Wildlife Biologist
Ron Murphy	_____	Recreation
Al James	_____	Silviculture
Evan Olson	_____	Botany

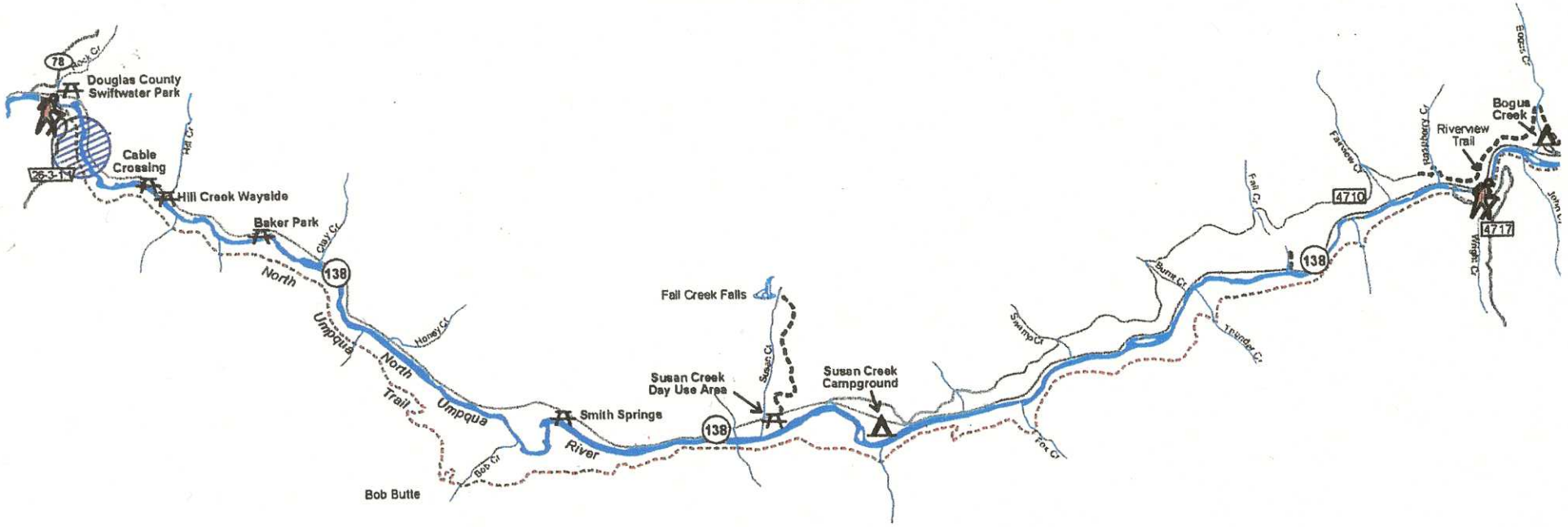
Completed _____

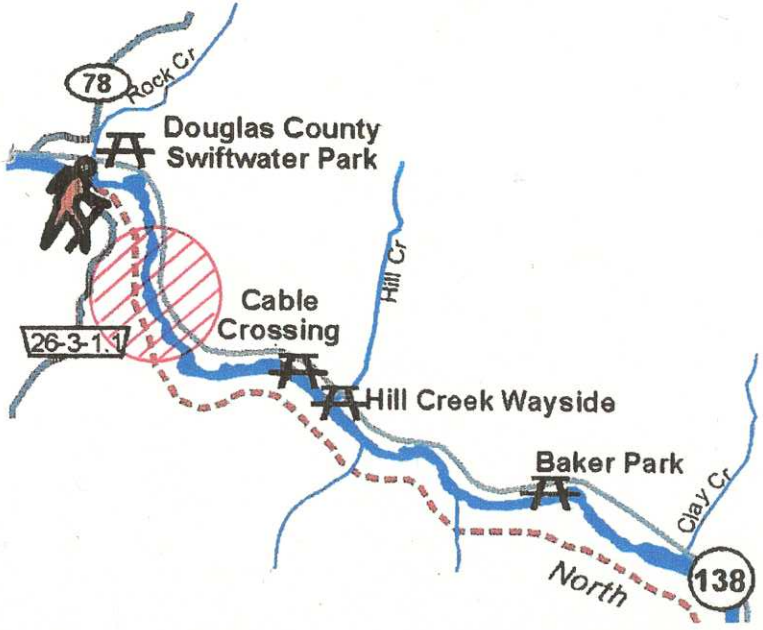
CRITICAL ELEMENTS OF THE HUMAN ENVIRONMENT

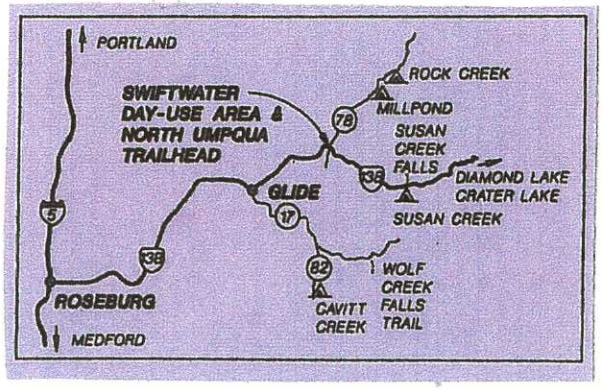
The following elements of the human environment are subject to requirements specified in statute, regulation, or executive order. These resources or values are either not present or would not be affected by the proposed actions or alternatives, unless otherwise described in this EA. Individuals who assisted in the preparation of this analysis document this negative declaration below.

Element	Responsible Position	Not Present	Not Affected	In Text	Initials	Date
Air Quality	Fuels Management Specialist		X			
Areas of Critical Environmental Concern	Environmental Specialist			X		
Cultural Resources	Archeologist			X		
Environmental Justice	Environmental Specialist		X			
Farm Lands (prime or unique)	Soil Scientist	X				
Flood Plains	Hydrologist		X			
Invasive, Nonnative Species	Botanist			X		
Native American Religious Concerns	Environmental Specialist		X			
Threatened or Endangered Species (fish)	Fisheries Biologist			X		
Threatened or Endangered Species (plants)	Botanist	X				
Threatened or Endangered Species (wildlife)	Wildlife Biologist			X		
Hazardous/Solid Wastes	District Hazardous Materials Coordinator		X			
Water Quality Drinking/Ground Water	Hydrologist			X		
Wetlands/Riparian Zones	Hydrologist			X		
Wild and Scenic Rivers	Recreation Planner			X		
Wilderness	Recreation Planner	X				

Tioga Segment
North Umpqua Trail







Project Location

Tioga Segment

Reconstruction of the North Umpqua Trail
from the junction with Deadline Falls 2605 ft. east.